

ORDINANCE (2004) 627 TC 246

TC-12-03

AN ORDINANCE TO REQUIRE THAT PERMANENT STORMWATER RETENTION PONDS AND DETENTION BASINS BE INCORPORATED INTO THE DEVELOPMENT OF A SITE AS AMENITY FEATURES OR THAT SUCH FACILITIES BE SCREENED FROM ON-SITE AND OFF-SITE VIEWS.

BE IT ORDAINED BY THE CITY COUNCIL OF THE CITY OF RALEIGH, NORTH CAROLINA that:

Section 1. That the Raleigh City Code be amended to include the following new subsection 10-2082.13:

Sec. 10-2082.13.

SCREENING REQUIREMENTS FOR PERMANENT STORMWATER RETENTION PONDS AND DETENTION BASINS

(a) Purpose.

Due to their nature as service features, some stormwater control facilities can have a negative visual impact upon properties where they are located as well as upon adjacent properties and the adjacent public realm. As a result of these factors, the purpose of this Section is to:

- (1) Mitigate the negative visual impact from certain stormwater control facilities by requiring screening from on-site and off-site views;
- (2) Recognize that a stormwater control facility may include elements which allow it to function as a site amenity;
- (3) Explain the conditions under which a stormwater control facility could be considered as a site amenity, and therefore not require screening; and
- (4) Offer incentives for development of stormwater control facilities as site amenities.

(b) Applicability.

The provisions of this Section *shall* apply to all off-site and on-site permanent stormwater retention ponds and detention basins permitted, constructed, and/or modified to a cumulative extent greater than fifty (50) percent of their original size after application of this ordinance.

Editor's Note: Section 10-2082.13 first became applicable on June 3, 2004 (Ord. No. 627 TC 246).

(c) Screening Requirements.

- (1) All permanent on-site and off-site stormwater retention ponds and detention basins subject to the provisions of this Section shall provide vegetative screening from on-site and off-site views consistent with the following requirements:
 - a. All vegetative screening shall be 75% locally-adapted evergreen species; and
 - b. All vegetative material *shall* be planted so as to attain a screen occupying at least seventy-five (75) percent of a vertical plane around the perimeter of the facility to an average height of six (6) feet above grade within three (3) years of planting; and
 - c. Screening *shall* be required around the base of the dam structure (as applicable), but not on the dam structure, with those plant materials in immediate proximity to the dam characterized by shallow, non-invasive root systems; and
 - d. Screening *shall* not be required within required facility inlets or facility outlets, nor within a maintenance access path provided that such path does not exceed twelve (12) feet in width; in all other instances, within three (3) years of planting the maximum open horizontal space between vegetative screening materials *shall* not be more than two (2) feet in width; and
 - e. Vegetative material composing the screen *shall* be selected and installed so as to exhibit variety in texture, color, spread and height by using ornamental and/or deciduous shade trees in combination with evergreen materials; and
 - f. In some cases, vegetative material *may* be placed in clusters or groups to add additional visual interest as well as to achieve intermittent levels of vertical height; and
 - g. In areas where the required screening is immediately adjacent to other required yard or landscaping areas, the trees or shrubs required for screening the facility *may* be relocated to elsewhere within the facility perimeter of the facility provided that the screen requirements in (1)b. above are met; and
 - h. In situations where the stormwater control facility utilizes a fence, all vegetative material associated with screening the facility *shall* be located outside the fence; and
 - i. In situations where a fence and gate are proposed, the fence and gate *shall* be colored black, forest green, dark brown or similar dark color so as to recede from view, unless the fence is constructed of masonry, wood, or similar natural material, in which case it *may* be left to weather naturally.

- (2) Permanent stormwater retention ponds and detention basins and their related facilities, including associated amenity features *shall* not be placed within required tree protection areas nor landscaping areas, including but not limited to: *street protective yards*, *vehicular surface area* landscaping, *utility service area* landscaping, *loading/display area* landscaping, or *transitional protective yards*.
- (3) Stormwater control facility vegetative screening material *shall* not be credited towards other required landscaping, including but not limited to: *street protective yards*, *vehicular surface area* landscaping, *utility service area* landscaping, *loading/display area* landscaping or *transitional protective yards* except as provided for within this Section.
- (4) Stormwater permanent retention ponds and detention basins which contain amenity features as set forth in Section (d) below *shall* be exempted from these screening requirements.

(d) Amenity Approval Criteria.

Permanent stormwater retention ponds and detention basins *may* be supplemented with certain features which enable the facility to function as an amenity to the site or development in addition to its primary function as a stormwater device. In situations where such amenity features are provided consistent with these provisions, no screening of the stormwater control facility from on-site or off-site views *shall* be required. In the event a permanent stormwater retention pond or detention basin loses a feature by which the facility qualifies as an amenity, the feature *shall* be restored within 30 days, or the facility *shall* be subject to the screening provisions listed in the Section above.

(1) Basic Amenity Features. To qualify as an amenity to the site or development where it is located, the following basic amenity features *shall* be provided within any stormwater control facility:

- a. Integration of the permanent stormwater retention pond or detention basin into the design of the public areas within the site or development through the use of appropriate placement, common building materials, textures, features, or other treatments intended to lend architectural significance to the stormwater control facility. For the purposes of this Section, “integration” shall mean at least two (2) of the following three (3) elements:
 - 1. Proximate placement of the stormwater facility to the principal structure(s), or
 - 2. Provision of pedestrian access to the facility through installation of a delineated walk or trail from the principal structure(s), or
 - 3. Utilization of similar planting materials and building materials as used in the principal structure(s).

- b. No fence *shall* be installed around the permanent stormwater retention pond or detention basin which acts to prevent pedestrian access to the facility from the site or development where it is located; in cases where a fence is needed to restrict access, such fence *shall* be screened in accordance with the screening provisions described in Subsection (c).
- c. Rock riprap or other “hard armoring” *shall* be limited to ten (10) percent or less of the entire surface area of the stormwater control facility above the low pool line.
- d. Permanent stormwater retention ponds and detention basins *shall* incorporate features designed to reduce mosquito populations through provision of non-chemical mosquito mitigation measures, including but not limited to: cyclical alteration of the pond level, installation of aeration/agitation features to disrupt larval growth, providing nesting boxes for mosquito-predacious birds or bats, or stocking ponds with mosquito-predacious fish (e.g. *Gambusia affinis holbrooki*).

(2) Supplemental Amenity Features. In addition to the basic requirements described in subsection (1) above, a permanent stormwater retention pond or detention basin must also provide supplemental features to be considered an amenity. The types of supplemental amenity features differ based upon the type of stormwater control facility.

- a. Permanent retention (wet) ponds.

To be considered as an amenity feature, permanent retention ponds *shall*:

- 1. Retain water within a permanent pool, and
- 2. Maintain slopes of 4:1 or shallower to a distance of ten feet below the median pool line (beyond which slopes may become steeper); alternatively, a retaining wall may be incorporated into a portion of the facility, provided the design of the wall is in accordance with §10-2082.13 (d)(1)a. above, and
- 3. Include horizontal curves or other sculptural elements within the shape of the facility so as to avoid a simple square or round shape.
- 4. Provide at least two (2) of the following four (4) features:
 - a. Inclusion of an active water feature (i.e., aerator / fountain / waterfall) within or adjacent to a permanent pool(s), or
 - b. Pedestrian access trails to and/or around the stormwater control facility from the existing and/or proposed pedestrian network associated with the site or development. Such access *shall* not be required to meet the minimum specifications for sidewalks or multipurpose trails as described within the

City's standard specifications and details, and may be constructed of any discernible, leveled, and stable surface material, including but not limited to: brick or masonry, gravel, mulch, wood chips, mowed grass or low groundcover, or

- c. Provision of riparian plant materials throughout the stormwater control facility to prevent erosion and add visual interest, and additional perimeter plantings consisting of at minimum three (3) ornamental trees or two (2) shade trees totaling eight (8) inches in caliper at time of planting, and four (4) shrubs for every one hundred (100) linear feet equivalent to the pond's maximum pool circumference and located no more than seventy-five (75) feet from the pond's maximum pool line, or
- d. Inclusion of other permanent, pedestrian-oriented features, including but not limited to: seating, dining tables, and mounted trash cans, in areas around or proximate to the stormwater control facility.

b. Detention (Dry) Basins.

To be considered as an amenity feature, detention ponds *shall*:

1. Not contain water on a permanent basis, and
2. Provide a one hundred (100) percent vegetative cover capable of withstanding extended periods of inundation, except in spaces designed for specific recreational uses (e.g., baseball fields), and
3. Maintain slopes of 4:1 or shallower; alternatively, a retaining wall may be incorporated into a portion of the facility, provided the design of the wall is in accordance with §10-2082.13 (d)(1)a. above, and
4. Provide at least two (2) of the following three (3) features:
 - a. Pedestrian access trails to the stormwater control facility from the existing and/or proposed pedestrian network associated with the site or development. Such access trails *shall* not be required to meet the minimum specifications for sidewalks or multipurpose trails as described within the City's standard specifications and details, and may be constructed of any discernible, leveled, and stable surface material, including but not limited to: brick or masonry, gravel, mulch, wood chips, mowed grass, or
 - b. Inclusion of other permanent, pedestrian-oriented features, including but not limited to: seating, dining tables, and mounted trash cans, in areas around or proximate to the stormwater control facility, or

- c. Grading and slopes of 8:1 or shallower which will allow utilization of the facility as an area for recreation when not in use as a detention facility (except on the dam structure and as is necessary to tie the dam back to existing grades); alternatively, a retaining wall may be incorporated into a portion of the facility, provided the design of the wall is in accordance with §10-2082.13 (d)(1)a. above.

(e) Incentives.

When a permanent stormwater retention pond or detention basin provides amenity features in compliance with the minimum requirements of Subsection (d), then the following provisions *may* also apply:

- (1) The permanent stormwater retention pond and detention basin and their related facilities, including amenity features, *may* be placed within required landscaping areas, including but not limited to: *street protective yards, vehicular surface area landscaping, utility service area landscaping, loading/display area landscaping, or transitional protective yards* (except in tree conservation areas adjoining thoroughfares, within areas zoned for Resource Management, tree protection areas, and in *natural protective yards*).
- (2) When a permanent stormwater retention pond or detention basin is located within a required landscaping area, the portion of land associated with or adjacent to the stormwater control facility *shall* only be required to meet eighty (80) percent of the minimum planting requirements of the required landscaping area.

Section 2. That Raleigh City Code Section 10-2146.5(a) be amended to include a new entry in the Cross reference which *shall* read:

“Permanent stormwater retention ponds and dry detention basins §10-2082.13(b).”

Section 3. That Raleigh City Code Section 10-3073(a)(6)d. be repealed and rewritten to read as follows:

“d. The retention pond is an amenity complying with Section 10-2082.13(d).

Cross reference: “Permanent stormwater retention ponds and dry detention basins §10-2082.13.”

Section 4. All laws and clauses of laws in conflict herewith are hereby repealed to the extent of said conflict.

Section 5. If this ordinance or application thereof to any person or circumstance is held invalid, such invalidity shall not affect other provisions or applications of the ordinance which can be given separate effect and to the end the provisions of this ordinance are declared to be severable.

Section 6. This ordinance has been adopted following a duly advertised joint public hearing of the Raleigh City Council and the City Planning Commission following a recommendation of the Planning Commission.

Section 7. This ordinance has been provided to the North Carolina Capital Commission as required by law.

Section 8. This ordinance shall be enforced by law as provided in G.S.N.C. 160A-75 or as provided in the Raleigh City Code. All criminal sanctions shall be the maximum allowed by law notwithstanding the fifty dollar limit in G.S. 14-4(a) or similar limitations.

Section 9. This ordinance shall become effective thirty (30) days following its adoption, and it shall not apply to stormwater retention ponds and detention basins submitted to the City prior to the effective date of this ordinance.

Adopted: 5/4/04

Effective: 6/3/04

DISTRIBUTION: Planning – Chapman, Hallam, Powell, Sumpter, Brandon, Grudzinski
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